United States Department of Agriculture

Moroni Exploration Project

Environmental Assessment and Finding of No Significant Impact

Forest Service

Ashley National Forest & Uinta-Wasatch-Cache National Forest

June 2021

For More Information Contact:

David Herron
Duchesne/Roosevelt District
Ashley National Forest
85 West Main, P.O. Box 981
Duchesne, Utah 84021
Phone: 435-781-5218
Email: david.herron@usda.gov

Responsible Official:

Kristy Groves
District Ranger
Roosevelt-Duchesne Ranger District

Cover photo shows Mike Hanna (proponent) in the Iron Mine Creek area of the Ashley National Forest

Introduction

The Ashley National Forest received a plan of operations, from Jeff Fabrizio and Mike Hanna (project proponents), to conduct exploratory trenching and bulk sampling for locatable minerals on their existing mining claims, within the Iron Mine Creek area of the Duchesne District of the Ashley National Forest (see Figures 1 and 2). The proposed trenching and bulk-sampling would take place in two small adjacent areas, within the proponent's existing mining claims. For needed heavy equipment access to the exploration sites, a closed but existing road on the Uinta-Wasatch-Cache NF would be re-opened for project use, and then approximately 0.59 miles of new temporary road would be constructed on the Ashley NF.

We are proposing to approve the plan of operations, allowing the proponents to conduct their proposed exploration activities. We prepared this environmental assessment (EA) to determine whether to prepare an environmental impact statement or a finding of no significant impact.

Proposed Project Location

The project area is located in the Iron Mine Creek area of the Ashley and Uinta-Wasatch-Cache National Forests within the NW ¼ of Section 20, T2N R9W Uinta Meridian. See Figures 1 and 2. The area is fairly remote and rarely visited, with few other ongoing or nearby uses or activities. A small block of private land occurs less than a mile upstream to the west.

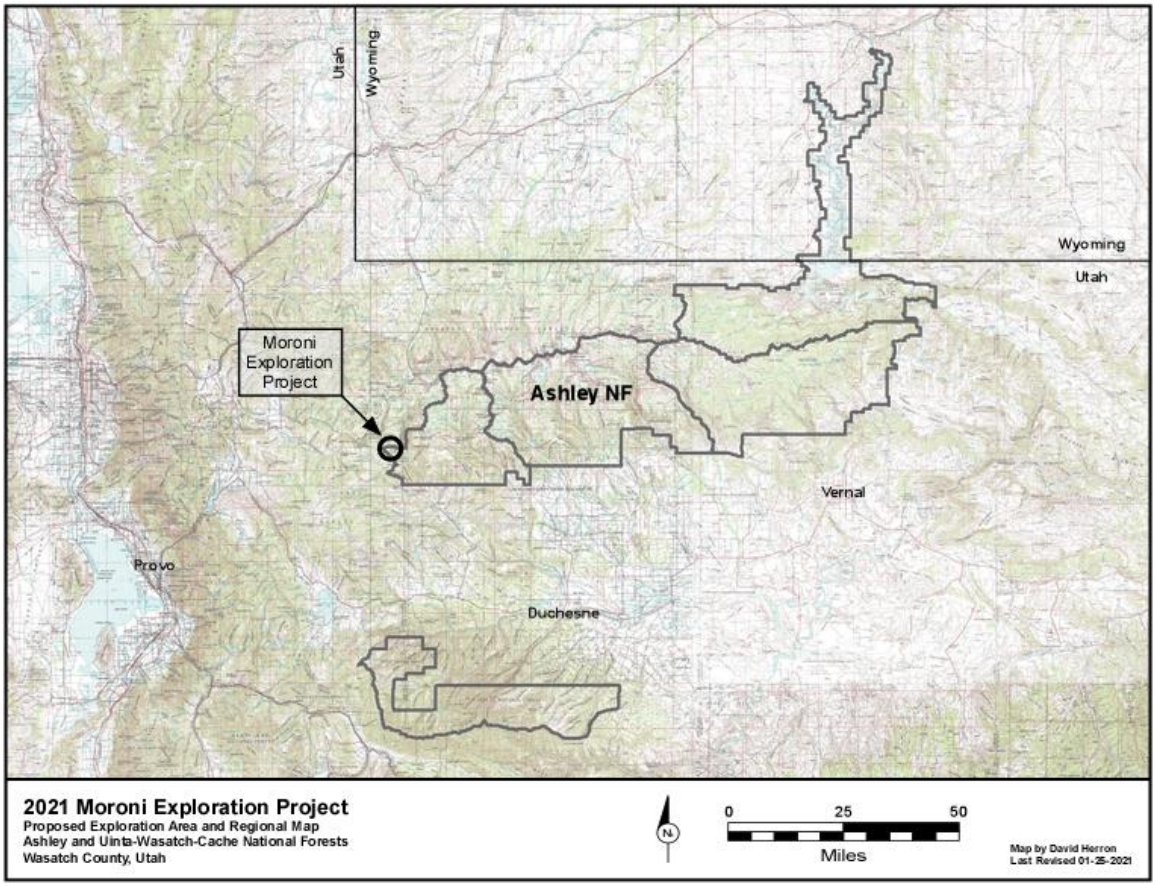

Figure 1. Moroni regional map

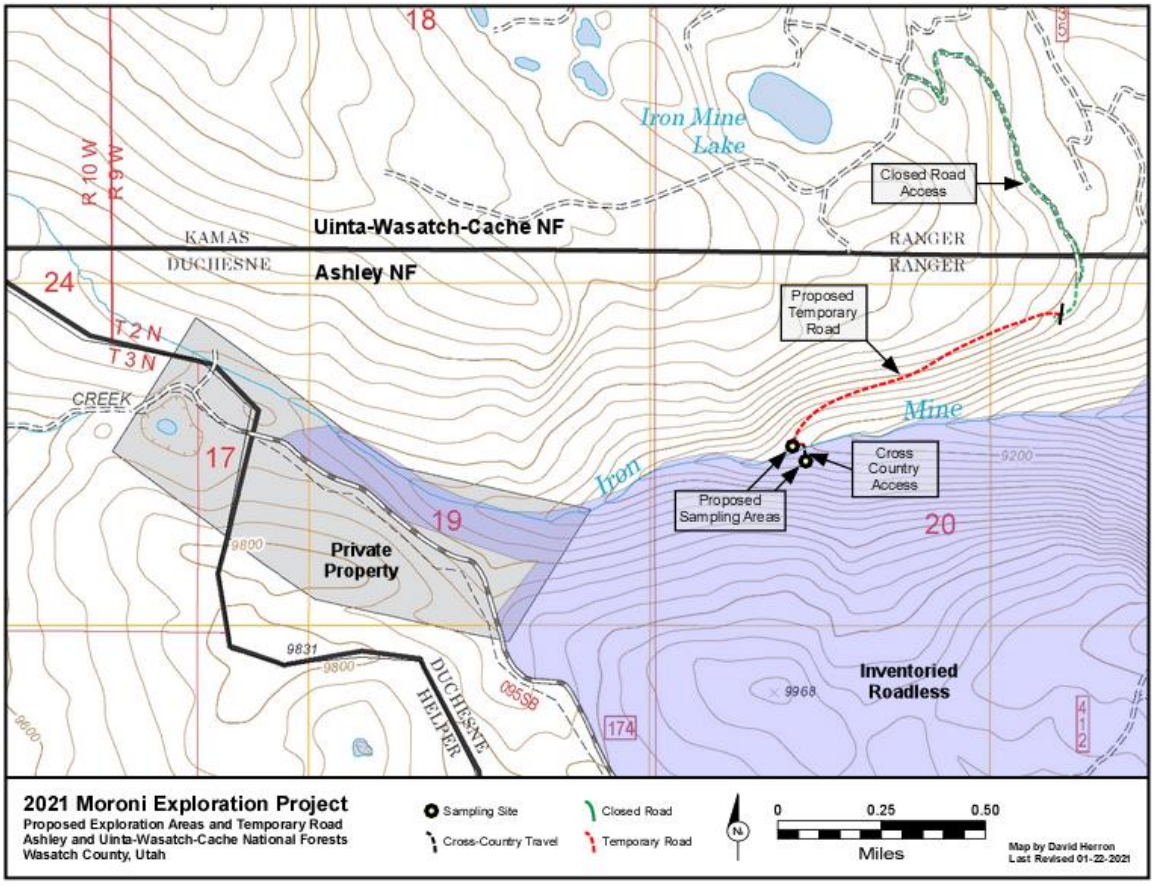

Figure 2. Moroni project map

Need for the Proposal

The proponents submitted a Plan of Operations to the Ashley National Forest, proposing to conduct exploratory trenching and bulk sampling within their existing mineral claims, in accordance with U.S. mineral rights laws and regulations. These laws and regulations confer a legal right to mining claim holders to reasonably access, explore for, and remove locatable minerals within their valid mining claims. As the land managing agency, and in accordance with the National Environmental Policy Act (NEPA) and applicable Forest Service regulations, the Ashley National Forest needs to evaluate and respond to the submitted proposal in a timely manner. The Forest must also determine whether any additional design features or mitigation measures might be needed, to minimize adverse environmental impacts to other National Forest resources. The analysis conducted for this EA will help determine if such design features or mitigation measures are needed to ensure there are no significant impacts from the Project. Below is a description of the proposed action.

Proposed Action

The proposed action is to allow the project proponents to conduct exploratory trenching and bulk-sampling at two small adjacent sites, within the proponent's existing mining claims. Both

exploration sites are adjacent to Iron Mine Creek, within the NW 1/4 of Section 20, T2N R9W Uinta Meridian. See Figures 1 and 2. At both exploration sites, an excavator would be used to dig a deep trench, to expose suspected ore zones. The trenches would be excavated down into the hillslope, to an unknown depth (up to a maximum of 50 feet), to expose suspected ore materials. One bulk sample would be collected from each exploration trench, with each sample weighing approximately 20 tons. Collected samples would then be removed from the Forest via dump truck, for additional off-site testing. The proponents propose to stack excavated overburden directly on the ground, along the sides of the sampling trenches. However, since the volume of overburden could range from several hundred to several thousand yards per trench, and some of the surrounding terrain is steep or timbered, much of the overburden material will likely need to be moved and stacked farther away, in one or more temporary stockpiles in the flat meadow areas on the north or south sides of the creek.

Project Access and Roads

Access for this project would start from existing roads on the Uinta-Wasatch-Cache NF (UWC Roads 037, 414, 414A). From road 414A, an existing closed road (UWC Road 83993) would be reopened, allowing project-related vehicle access (about 0.84 miles). Closed road 83993 continues onto the Ashley National Forest, before ending at an overlook into Iron Mine Creek. Near that point, a new temporary road would be constructed across the Ashley NF, angling down and westward towards Iron Mine Creek and the proposed exploration sites. The temporary road would be about 0.59 miles long, ending at the meadow and northern exploration site. The temporary road would be built using a track-mounted excavator, and would be constructed and maintained only to the width and quality needed for project-related heavy equipment and vehicle access. Heavy equipment access to the southern exploration site would be cross-country, without the need for road construction. However, a temporary bridge would be needed for heavy equipment to cross the creek without impacting the stream. It is expected that a temporary bridge would be constructed using downed timber from road construction.

In addition to the exploration trenches and temporary road, it is expected that a small cleared area will also be needed on the north side of the creek, to accommodate project-related equipment and supplies. The northern side of the creek is outside of inventoried roadless. This is where the temporary road construction, northern sampling site, staging area, and some of the soil and overburden stockpiles would be located. However, the southern sampling site, and related soil and overburden stockpiles, would be located on the southern side of Iron Mine Creek, which is mapped as Inventoried Roadless.

Project Equipment

Proposed vehicles and heavy equipment for this project include up to 3 pick-up trucks, up to 3 ATVs, a single track-mounted excavator (probably 315 Cat), a single 10-ton rubber-tire dump truck, and a service truck (for periodic maintenance and refueling of the excavator and dump truck). It is expected that the excavator would only need 2 round trips to the project area (one round trip for the first season construction and sampling, and a second round trip for the second season reclamation), and that the dump truck would only need to make about 8 round trips.

There are no hazardous materials associated with this project, other than fuels and similar materials needed for vehicle and heavy equipment maintenance and support. Fuels and other potentially hazardous materials would be properly stored in small containers or service vehicles. The excavated materials and ore samples are not expected to be acid-generating or contain significant levels of hazardous metals.

Site Reclamation

Following removal and transport of the two bulk samples, the exploration trenches would be reclaimed by backfilling of the trench to approximate surface contours, using the excavated overburden materials. Backfilled trench areas would then be covered with salvaged topsoil, and a Forest-approved seed mix would be applied. Following proper reclamation of the sample trenches and camp areas, and cleanup and removal of all old campsite materials and equipment, the temporary road and stream crossing area would then be reclaimed. Reclamation of the stream crossing would involve removal of any temporary bridge materials. Reclamation of the temporary road would be done by pulling displaced materials back up onto the roadbed, to re-establish the approximate original slope contours, followed by seeding with a Forest-approved seed mix. To encourage full and proper reclamation of the project sites and temporary road, the project proponents would be required to post an appropriate reclamation bond before the proposed activities would be allowed proceed. The bond amount would be held by either the Forest Service or State of Utah Division of Oil Gas and Mining, until those agencies determine that reclamation has been successfully completed, and would be an amount determined sufficient to cover estimated costs if reclamation had to be conducted by those agencies.

Project Timeframe and Surface Disturbances

It is expected that the proposed road construction, trenching, and sampling activities would be started and completed within one field season (summer and fall 2021). Reclamation of the sampling trenches, overburden dumps, and proposed temporary access road would then likely occur the following field season (summer and fall 2022). Total maximum surface disturbance for the project is estimated to be about 1.73 acres. This includes about 1.42 acres for the new temporary road, about 0.09 acres for the two sampling trenches, and up to about 0.22 acres for stockpiling of the overburden materials.

Project Design Criteria and Mitigation Measures

The following design criteria and mitigation measures have been incorporated into the proposed action, to minimize the likelihood or severity of potential adverse impacts from implementation of the proposed exploration project.

General Design Criteria

- Project activities needing heavy equipment (road construction, trench excavation, sampling, trench backfilling, and road reclamation) shall not occur between October 31 and July 15. (for wildlife, public and proponent safety, minimize road damage)
- Following removal and transport of the two bulk samples, the exploration trenches would be reclaimed by backfilling of the trench to approximate surface contours, using the excavated overburden materials. Backfilled trench areas would then be covered with salvaged topsoil, and a Forest-approved seed mix would be applied. (for successful reclamation of project disturbances)
- The temporary road shall be reclaimed, when no longer needed for project-related purposes. Reclamation of the temporary road shall include pulling displaced materials back up onto the roadbed, to re-establish the approximate original slope contours, followed by seeding with a Forest-approved seed mix. (for successful reclamation of project disturbances)

Access Roads

- Project vehicles and heavy equipment shall remain on designated Forest Service roads, the proposed temporary road, or within the proposed sampling and disturbance areas. No unauthorized off-road vehicle travel is allowed. (for travel management, roadless)
- Proponents shall secure the project area and temporary road by placing and maintaining a locked gate at the beginning of Forest Road 83993 (closed road), to prevent unauthorized vehicle access to the project area. The gate shall meet standards and design requirements provided by the Uinta-Wasatch-Cache National Forest. (for site security, travel management)
- The maximum grade of the temporary road shall be 10% or less. (for safety, erosion)
- The temporary road shall be constructed on cut, with spoils placed next to the road on the downhill side. The road shall be out sloped 2 to 4 degrees and should not have a berm on the downhill side. (for safety, road damage and erosion)
- The temporary road shall include an intervisible pullout (wide spot) near the midpoint, to allow vehicles to pass by each other if needed. (for safety)
- Vehicles and heavy equipment shall not operate when roads or sampling areas are muddy or snow-covered. (for safety, road damage and erosion)
- Do not transport heavy equipment or dump trucks on Forest Service roads on weekends, on opening days of general deer and elk seasons, after noon on the day before opening days of general deer and elk seasons, or the following state and federal holidays: Memorial Day, Independence Day, Utah Pioneer Day, and Labor Day. (for public safety)
- Post warning signs at Forest Service road junctions, whenever heavy equipment or dump trucks will be transported or operating on Forest Roads open to the public. (for public safety)
- Project equipment shall not block or damage Forest Service roads. Any damage to Forest Service roads shall be repaired in a timely manner.

Iron Mine Creek

- Heavy equipment crossings of Iron Mine Creek shall be the minimum number of crossings needed. The stream crossing disturbance, between the banks, must be kept to the smallest footprint possible. Light vehicles (trucks, ATVs, etc.) shall not cross Iron Mine Creek, except as needed to service heavy equipment. (for water quality, safety, roadless resources)
- A minimum 50-foot buffer should exist between any excavated material and the active stream channel. Where not possible, a 15-foot buffer with silt fencing shall be maintained between the material and the stream channel. (for water quality)
- Topsoil, overburden, and other (non-sample) excavated materials from exploration or road construction shall not be transported across Iron Mine Creek. (for water quality, roadless)
- Project proponents shall ensure that stream crossings by heavy equipment do not adversely impact Iron Mine Creek or its banks or channel. If proponents choose to place materials within the stream channel (between the channel banks), to facilitate crossings of Iron Mine Creek, they are responsible for obtaining and complying with any needed stream-alteration permits. (for water quality, other regulatory permits)

Fuels and Potentially Hazardous Materials

- Hazardous materials (including fuels) will not be stored on National Forest System lands outside of the operating season, outside of the approved disturbance areas, or within riparian areas. Fuels and other chemicals should be transported and stored only in labelled leak-proof containers. (for safety, hazardous materials)
- Potentially hazardous materials (including fuels, oils, antifreeze, and other chemicals) used or stored on-site shall be kept to the minimum reasonably needed for project purposes, and shall not be disposed or discharged to the Forest.
- Equipment refueling and servicing will occur at least 50 feet away from the stream. In the event of a fuel or hazmat spill, proponent must immediately notify the appropriate state and forest service personnel. (for water quality, hazardous materials)
- To assist with rapid spill cleanup and response, spill kits and appropriate cleanup materials shall be stored on-site. Fire extinguishers shall also be kept on site, in case of emergencies. (for safety, hazardous materials)

Safety

- The proponents are responsible for employee and public safety within the project area. Proponents will ensure that project working conditions and areas are sanitary, and are not hazardous or otherwise dangerous to themselves or others. (for safety)
- All camping and prospecting equipment within the project area, not needed for the current exploration project, shall be removed from the Forest before trenching and bulk sampling operations can begin. (for safety, enforce reclamation of prior activities)
- To reduce rockfall and slope failure hazards at the southern sampling site, trench walls more than 10 feet tall must be stair-stepped to reduce slope. At minimum, horizontal benches at least 5 feet wide are needed for every 10 feet of trench depth. (for proponent and equipment safety)
- To reduce rockfall and slope failure injuries, no persons shall be within or immediately above sampling trenches, while heavy equipment is operating or powered within or near the same sampling trench. No persons should be within or immediately above the sampling trenches unless another person outside the trench area is watching and acting as safety spotter. (for proponent safety)
- If sample trenches are not backfilled and reclaimed before winter, install plastic poles and avalanche fencing around trenches to prevent snowmobiles from falling into the trenches. (for public safety)

Other Resource Issues

- Excavated topsoil from sample trenches shall be stockpiled for later reclamation use. Topsoil stockpiles should be located away from active operations, to avoid compaction by equipment or burial or mixture with other excavated materials. (for successful reclamation of sample trenches)
- Heavy equipment shall be cleaned prior to entering National Forest System lands, to minimize the spread of noxious weeds and potentially hazardous materials. (for minimizing weeds, hazmat)

- The proponents shall provide and maintain appropriate portable toilet facilities within the project area during active operations. (for safety, sanitation)
- No burning of waste materials shall be conducted on-site. Vehicles and equipment shall be kept in good working condition to minimize emissions. (for air quality)
- If project operations intersect or discover open cavities, natural caves, or significant karst features, project operations within 100 feet of such features shall stop immediately, and the Forest Service shall be contacted for further instructions. Project operations will not resume until authorized to do so by the Forest Service. (for protection of geologic resources)
- If project operations discover any (previously unknown) cultural or archaeological resources, project operations within 100 feet of such resources shall stop immediately, and the Forest Service shall be contacted for further instructions. Project operations will not resume until authorized to do so by the Forest Service. (for protection of cultural resources)
- The proponents shall obtain any other needed Federal, State, or County permits or approvals, before commencing operations. For example, Wasatch County approval for fuel storage facilities, sanitation facilities, or temporary living quarters, or Army Corps of Engineers permits that might be needed for stream alterations to iron Mine Creek. (for compliance with other state and federal laws and agencies)

Alternatives Considered but Eliminated from Detailed Study

Several alternate routes for the proposed road construction and heavy equipment access were examined and discussed with the proponents. A hard look at these alternate routes showed they would create more surface disturbance than the route currently proposed, and the alternate routes were deemed infeasible by the proponents. The alternate routes would also lead to greater impacts to inventoried roadless areas. For these reasons, the alternate road routes were eliminated from detailed study.

A “no action” alternative was also considered, under which the proposed mineral exploration project would not be authorized. Such an alternative violates the operator’s statutory right to prospect and mine on lands open to such activities under the General Mining Law of 1872. Accordingly, it is not within the discretion of the authorized officer to take no action on a plan of operations for purposes reasonably incident to prospecting, mining, or processing of locatable minerals (36 CFR 228.5). Therefore, a no action alternative will not be further discussed in this document.

Environmental Impacts

This section summarizes the expected impacts of the proposed action on each of the resource areas we analyzed in detail. We chose these resource areas based on the following: legal or policy requirements (regulatory framework), potential significance, and/or relation to the project objectives and the decision to be made. The interdisciplinary team considered the best available scientific information regarding each resource area when conducting their analysis. See the relevant specialist reports in the project record for a more detailed analysis of effects. The affected environment and summarized potential effects are as follows.

Issues

This section includes the issues identified for detailed analysis because the impacts of the proposed action may be related to potential significance or the ability to meet the purpose and need of the project. The following issues were identified and analyzed to determine the potential for significance: potential impacts to hydrology and water quality, aquatic species, terrestrial species, plant species, cultural resources, recreation, visuals, inventoried roadless, and geologic resources and hazards. Each of these issues is briefly addressed or summarized below.

Additional issues were briefly considered for this project, but were not analyzed in detail because impacts from these are not expected to be significant, based on the nature, short duration, small scale, design features, or general location of the project. Non-significant issues for this project, which were briefly considered but dropped from detailed analysis include (among others): grazing, timber, invasive weeds, air quality, climate change, environmental justice, wildfire, soils, and potential economic impacts.

Environmental Impacts of the Proposed Action

This section describes or summarizes environmental impacts from the proposed action, relative to the issues identified for detailed analysis.

Hydrology and Water Quality

A specialist report was prepared by the Ashley National Forest, to analyze potential impacts from the project to hydrology and water quality resources and concerns. This section of the EA summarizes the environmental impacts analysis from that report in the project record.

Potential effects examined consist of impacts to water quality, wetlands, floodplains, stream channels and associated riparian areas, as well as sediment yield changes related to soil disturbance and ground cover removal. Relevant to Cumulative Effects, there are no known connected actions (past, present, and reasonably foreseeable) with effects to hydrology or water quality, which will occur within the temporal and spatial bounds for analysis.

Hydrology: Potential direct effects would be primarily ground disturbance related to mechanical equipment, temporary routes, and storage of the spoils. Potential indirect effects include, but are not limited to, altering water quality from erosion post treatment. Increased sediment and turbidity in perennial creeks are a potential direct effect primarily associated with road construction adjacent and crossing of perennial streams. Provided that design features and BMPs are followed, the project work is not expected to exceed the Utah State criteria of 10 NTU instantaneously above background level or other water quality standards.

Water Quality: Potential indirect effects to water quality include, but are not limited to staging areas, dust contamination related to dry conditions, and human waste. The work crew should remove all refuse from the National Forest and maintain staging areas away from water resources. Through implementation of the project design features, Clean Water Act, State water quality standards, and beneficial uses would be met. Direct or indirect effects to water quality under this alternative would be minor and negligible.

Floodplains Wetlands Riparian Areas: BMPs and project design features would be expected to protect any of the limited floodplain, wetland and riparian area disturbance within the project area. Hence, the direct or indirect effects under this alternative would be minor and negligible.

Summary of Environmental Effects to Hydrology and Water Quality: The design of this project is such that minimal effects to watershed resources are expected from the proposed action. Possible effects to water quality, riparian areas and stream channel depend upon the extent and intensity of the ground disturbances. Effects on water quality may include increases in sedimentation and turbidity with subsequent channel aggradation. Some of the riparian and floodplain areas may be compacted and disturbed, but the effect should be minor. Design features and BMPs all contribute to the prevention of sediment delivery to streams and impacts to riparian areas or stream. The amount of actual sediment delivery is expected to be negligible. Therefore, streams and riparian areas are expected to experience minimal, short-term and insignificant effects.

Aquatic Species

A biological assessment, biological evaluation, and specialist report were prepared by the Ashley National Forest, to analyze potential impacts from the project to various aquatic species. This section of the EA summarizes the environmental impacts analysis from those reports in the project record.

Aquatic Federally Listed Species: The humpback chub, bonytail, Colorado pikeminnow, and razorback sucker are all native to the Colorado River Basin. Each of these species are listed as endangered by the USFWS and currently do not occur within the Ashley National Forest. There is no suitable habitat in the project area. No new water depletions from the Colorado River Basin would occur as a result of this project. Based on the analyses that were completed for this project, it was determined that the Proposed Action would have "No Effect" on all four Colorado River fish species identified as endangered.

Aquatic Forest Service Sensitive Species: One fish and two amphibian species on the Ashley National Forest are listed as sensitive by the R4 Regional Forester. These include the Colorado River cutthroat trout, Columbia spotted frog, and boreal toad.

Native cutthroat trout populations occur in suitable habitat across the Forest. There are no known CRCT populations within or near the proposed project area. Therefore, no direct effects to CRCT populations or habitat are expected. Design Criteria included in the Proposed Action would minimize potential increased sediment delivery to stream channels from soil disturbance associated with project activities. Therefore, the indirect effect of potential increased sediment in stream channels would result in No Impacts to CRCT populations or habitat.

Because there are no known populations of boreal toad or Columbia spotted frog within or near the proposed project area, there would be no direct or indirect effects to these species. Therefore, activities associated with the proposed project are expected to have No Impact on boreal toad, Columbia spotted frog or their habitat within or near the proposed project area.

Aquatic Management Indicator Species: Aquatic species analyzed for potential effects include cutthroat trout and aquatic macroinvertebrates, which are Ashley National Forest Management Indicator Species (MIS) for aquatic habitat.

Established buffers to the use of equipment around wet meadows, perennial and intermittent streams would eliminate the potential for direct effects to streams or aquatic habitat. Equipment would not be used within stream channels. Implementation of the proposed action is expected to have no direct effects to cutthroat trout or aquatic macroinvertebrates. The only indirect effect to cutthroat trout or aquatic macroinvertebrate populations and habitat would be the potential for increased delivery of sediment to the stream channel because of project activities. Design criteria

would minimize potential sediment delivery to stream channels because of project activities. Conditions within the project area are expected to stabilize within a three-year period. These effects would be short-term and then non-existent once conditions in the project area stabilize. Therefore, it is determined that the proposed project would not contribute to a negative trend for cutthroat trout or aquatic macroinvertebrates on the Ashley National Forest.

Summary of Environmental Effects to Aquatic Species: The Proposed Action would have No Effect on the four listed (endangered) aquatic species identified. The proposed project would be No Impact to aquatic Forest Service sensitive species or their habitat. The proposed project would not contribute to a negative trend for cutthroat trout or aquatic macroinvertebrates (MIS) on the Ashley National Forest. Because design criteria for the project would minimize sediment delivery to intermittent stream channels, and the indirect effects are expected to be short-term and not measurable, activities associated with the proposed project are not expected to contribute to significant cumulative effects to aquatic species habitat or populations when added to the effects of past, present (road use) and reasonably foreseeable actions.

Terrestrial Wildlife Species

A biological assessment, biological evaluation, and specialist report were prepared by the Ashley National Forest, to analyze potential impacts from the project to various terrestrial wildlife species. This section of the EA summarizes the environmental impacts analysis from those reports in the project record.

Terrestrial Federally Listed Species: The USFWS website lists Canada lynx (Threatened) as potentially affected. However, much of the project and associated disturbance is not within actual lynx habitat. The project may cut a few conifer and aspen trees for the temporary road and sampling sites. However, these will be just a handful of trees and would be negligible to lynx habitat. Therefore, the project would not impede movement of lynx through habitat, or the ability of a lynx to procure sufficient food if one happened to wander on the Ashley. The likelihood of an individual lynx being exposed to human activities facilitated by the project is very low given that the Ashley is considered unoccupied and that there are likely very few, if any lynx, in the Uinta Mountains. Therefore, there will be “no effect” to the Canada lynx or its habitat from the proposed project.

Terrestrial Forest Service Sensitive Species: Sixteen terrestrial species are listed as a Regional Forester's sensitive species and are known or suspected to occur on the Ashley NF and / or the Uinta-Wasatch-Cache NF. Of these sixteen species, only four are likely to occur within the project area, or have habitat in or near the project area, or be affected directly, indirectly, or cumulatively by implementation of the proposed action. These "likely to occur" species include the boreal owl, great gray owl, three-toed woodpecker, and northern goshawk.

Looking at the species likely to occur (boreal owl, great gray owl, three-toed woodpecker, and northern goshawk), it was determined that the project may impact individuals for each species, but would not cause a trend toward their federal listing or cause a loss of viability to the population of these species. Similarly, it was determined that cumulative impacts from a wide variety of other activities, combined with the proposed project, may impact individuals, but would not cause a trend toward the federal listing or cause a loss of viability to the populations of the boreal owl, great gray owl, three-toed woodpecker, or northern goshawk.

For the other sensitive species, not likely to occur (spotted bat, Townsend’s big-eared bat, greater sage-grouse, flammulated owl, bald eagle, peregrine falcon, bighorn sheep, wolverine, pygmy

rabbit, monarch butterfly gray wolf, and Columbia sharp-tailed grouse), it was determined that the Moroni Exploration Project will have no impact.

Terrestrial Ashley NF Management Indicator Species -and- Wasatch-Cache NF Focal Species: For the Ashley NF, there are six terrestrial management indicator species (MIS) that may be present within or near the project area. These include the red-naped sapsucker, warbling vireo, golden eagle, northern goshawk, Rocky Mountain elk, and mule deer. For the Wasatch-Cache NF, there is only one applicable terrestrial focal species, which is the northern goshawk. Northern goshawk was already addressed as a Forest Service Sensitive Species.

The red-naped sapsucker and warbling vireo serve as management indicators on the Ashley NF for deciduous woodlands. It was determined that implementation of the project may impact individuals, but would not affect the trend of red-naped sapsucker or warbling vireo populations on the Forest or impair the ability of the Forest to provide well-distributed habitat for these species.

The golden eagle is a management indicator on the Ashley NF for cliffs and rocks. It was determined that implementation of the project may impact individuals, but would not affect the trend of the golden eagle population on the Forest or impair the ability of the Forest to provide well-distributed habitat for this species.

Rocky mountain elk and mule deer are hunted, provide an important recreational activity on the Ashley National Forest, and bring in considerable economic activity to local communities. These species are listed as MIS for the Forest because of their economic importance as a hunted species. It was determined that implementation of the project may impact individuals, but would not affect the trend of the elk and deer populations on the Forest or impair the ability of the Forest to provide well-distributed habitat for these species.

Migratory Birds: Several species on the Birds of Conservation Concern and Priority Species lists occur or have habitats within or near the project area. These species include the golden eagle, three-toed woodpecker, Cassin's finch, and broad-tailed humming bird. The Cassin's finch and the broad-tailed humming bird are associated with the conifer near the project area. The golden eagle is a management indicator species, and the three-toed woodpecker is a Forest Service sensitive species, which have already been addressed. The project is unlikely to have any measurable effects to the broad-tailed humming bird and Cassin's finch.

Summary of Environmental Effects to Terrestrial Wildlife: It was determined that the Moroni Exploration Project will have no impact to the spotted bat, Townsend's big-eared bat, greater sage-grouse, flammulated owl, bald eagle, peregrine falcon, bighorn sheep, wolverine, pygmy rabbit, monarch butterfly gray wolf, and Columbia sharp-tailed grouse. The Moroni Exploration Project may impact individual boreal owls, great gray owls, three-toed woodpeckers, and northern goshawks, but would not cause a trend toward their federal listing or cause a loss of viability to their populations. The white-tailed ptarmigan, Lincoln's sparrow, song sparrow, and greater sage grouse do not have habitat in or near the project activities or would not be effected by project activities and therefore would not be affected by implementation of the proposed project. The Moroni Exploration Project may impact individuals, but would not affect the trend of northern goshawk, red-naped sapsucker, warbling vireo, golden eagle, Rocky Mountain elk, and mule deer populations on the Forest, or impair the ability of the Forest to provide well-distributed habitat for these species; nor impair the ability of the WCNF to contribute to the ecological conditions necessary to support the northern goshawk. The Moroni Exploration Project may impact individuals, but would not adversely affect US Fish and Wildlife Service Birds of Conservation Concern (Migratory Birds) or Utah Partners in Flight Priority Species

populations. Cumulative effects to terrestrial wildlife species, from a variety of other sources and activities within the analysis area, were determined to be negligible.

Plants

A biological assessment and biological evaluation were prepared by the Ashley National Forest, to analyze potential impacts from the project to various plant species. This section of the EA summarizes the environmental impacts analysis from those reports in the project record.

Federally Listed Plant Species: The only Threatened and Endangered plant to be expected on the Ashley National Forest is Spiranthes diluvialis. All other Threatened and Endangered plant species are well removed from the National Forest in distance and/or their habitat is not found on the National Forest. There is no potential habitat for the species within or adjacent to the project area. No effect to Threatened or Endangered plant species or their habitat is determined for activities of the proposed action. The best available science indicates that the Little Pond Reforestation Project is expected to have "No Effect" to Spiranthes diluvialis plants or populations.

Forest Service Sensitive Plant Species: The proposed actions are confined to the Glacial Canyon 7 (GC07) Landtype. No Forest Service sensitive plant species are known to grow within this landtype. Numerous plant surveys have occurred within the project area over the last two decades, with the latest occurring September 2010. Based on this information, a determination of "No Impact" is made for sensitive plants in relation to the proposed action. Best available science indicates this determination is made with high level of certainty.

Cultural Resources

A report was prepared by the Ashley National Forest, to analyze potential impacts from the project to cultural resources and as part of the section 106 compliance process. This section of the EA summarizes the environmental impacts analysis from that report in the project record.

Identification efforts encountered some minor evidence of historic activities in the area. Previous mining activities have left three prospect pits within the currently proposed north project area. The prospect pits did not contain any structural remains or artifacts and were not recorded as cultural sites because they meet the definition of isolated finds. The three prospect pits do not have any chronological artifacts or materials to give an indication of their age. They are assumed to be from the early 1900s based on vegetation overgrowth. It was determined that no historic properties are located within the Area of Potential Effect, therefore a determination of No Historic Properties Affected is appropriate for the project.

Recreation / Inventories Roadless / Visual Resources

Several specialist reports were prepared by the Ashley National Forest, to analyze potential impacts from the project to recreation, inventories roadless, and visual resources. This section of the EA summarizes the environmental impacts analysis from those reports in the project record.

Recreation Resources: As a result of the proposed action, impacts to recreation resources would occur over the next two years. The first year would be used to construct the temporary road and dig the exploration trenches and remove the samples. The second year would include completing the rehabilitation on the project area. Alternative recreation sites are available in the surrounding areas that contain comparable recreational opportunities. These impacts could cause safety concerns with the increase of larger vehicle traffic on the roads in the Moroni Exploration Project Area. The exposed trenches could be a safety concern for snowmobiles falling into them and not

being able to get out. By following the design elements, although the proposed action would have some effects on recreation resources, those effects would not be significant.

Inventoried Roadless Areas: A small portion of the project area falls within inventoried roadless area (IRA) #0419020, with a total area of 355,768 acres. The proposed exploration activities would only cover approximately 1.73 acres, of which approximately 0.05 acres will be within the IRA. Per the proposed action, an excavator would travel approximately 100 feet into the IRA which is within the Semi-Primitive Motorized ROS class. Within the IRA there would be no roads built; however, there would be temporary cross-country travel with an excavator to dig up an exploratory trench up to 50 feet deep. The exploratory trench will be buried and rehabilitated upon completion of the mining operations in the second year. These actions are allowed by the 2001 Roadless rule, which recognizes prior rights associated with existing valid mining claims, and leasable and salable minerals presently under lease or contract. The effects to inventoried roadless resources would not be significant.

Visuals: The proposed project will disturb approximately 1.73 acres. Visual qualities would be negatively affected in the short term, but long-term effects (which would include evidence of human induced management action) would be minimal, because the area of disturbance would be rehabilitated to match the established form, line, color, and texture of the naturally occurring landscape. For these reasons there would not be any major or significant effects to visual resources.

Summary of Environmental Effects to Recreation / Inventories Roadless / Visual Resources: There are no present or foreseeable future actions within the spatial scale of the project area, which would add to effects from the proposed project. Recreational activities would continue within the project area as before the project. The road system would not change following project completion and would remain a human control at the same level as prior to the project. Effects to recreation resources, inventoried roadless resources, and visuals from the proposed action would not be significant.

Geologic Resources and Hazards

A brief report was prepared by the Ashley National Forest, to describe and evaluate potential issues and impacts related to geologic resources and geologic hazards. This section of the EA summarizes the environmental impacts analysis from that report in the project record.

Geologic Resources: Examination of the project area and relevant geologic maps did not reveal any significant geologic resources which might be adversely impacted by the proposed project. The project area is not likely to contain significant palaeontologic resources, due to the age and nature of the underlying and surrounding bedrock. Cave and karst-related resources are not known to exist within the project area. However, the south side of Iron Mine Creek is underlain by carbonate rocks, where significant as-yet-undiscovered cave and karst resources could be present. The small scale of project activities, on the south side of Iron Mine Creek, and the design elements in place, mitigate for adverse impacts following inadvertent discovery of significant cave and karst resources by project activities. No adverse direct, indirect, or cumulative environmental effects are expected to result to geologic resources from implementation of the proposed project.

Geologic Hazards: Examination of the project area and relevant geologic maps did not reveal any significant risk from regional-scale geologic hazards. However, the southern sampling location would cut into fine-grained clay-rich soils and sediments below a relatively steep hillslope. Deep excavations at the southern sampling site are at risk of small-scale collapse and slope failure.

While there is little potential for significant environmental impacts, such small-scale collapse could put the project proponents and equipment at significant risk. If the design features for this project are properly implemented, then these geologic and safety hazards should be appropriately mitigated. No adverse direct, indirect, or cumulative environmental effects are expected to result from implementation of the proposed project.

Summary of Environmental Effects to Geologic Resources and Hazards: No adverse direct, indirect, or cumulative environmental effects are expected to result to geologic resources or geologic hazards from implementation of the proposed project.

Summary of Environmental Impacts

From the analysis described and summarized above, and based on additional data in the project record, the proposed project would likely have minimal effects to a variety of resources. However, those effects would not be significant, would be short-term, and would not lead to long-term adverse trends or effects.

Finding of No Significant Impact

As the responsible official, I have reviewed the environmental impacts of the project relative to the definition of significance established by Council on Environmental Quality (CEQ) Regulations (40 CFR 1501.3[b]) and have determined that the proposed action would not have a significant effect on the quality of the human environment. My determination takes into consideration the project design criteria and mitigation measures to be included as part of the proposed action. Because of this finding of no significant impact, there is no need to prepare an environmental impact statement. My rationale for this finding is as follows and considers the potentially affected environment and the degree of effects.

Potentially Affected Environment

Appropriate to the proposed action, I considered the locally affected area and its resources as documented in the EA and project record.

Factors Considered for Degree of Effects

Both Short- and Long-Term Effects:

This environmental assessment summarizes potential effects compliance with relevant law, regulation, and policy. Specialists considered both short- and long-term effects. None would cause a significant impact on the various resources contributing to the quality of the human environment. Project design features and subsequent site reclamation would reduce expected impacts to low levels.

Both Beneficial and Adverse Effects:

Specialists considered both beneficial and adverse effects, none of which would rise to the level of a significant impact. Project design features and subsequent site reclamation would reduce expected adverse impacts to low levels.

Effects on Public Health and Safety:

Specialists considered effects to public health and safety, including safety of the project proponents, and determined that project deign features and subsequent site reclamation would reduce expected adverse impacts to low levels.

Effects That Would Violate Federal, State, Tribal, or Local Laws Protecting the Environment:

We have analyzed the proposed action for compliance with applicable environmental laws. As documented in this environmental assessment and in the project record, no laws would be violated.

Summary of Public Involvement

As part of our scoping efforts, the Forest Service outreached to the following individuals, organizations, and Federal, State, tribal, and local agencies during the development of this EA:

- Uinta-Wasatch-Cache National Forest, Heber-Kamas Ranger District
- At least 464 electronic subscribers
- Eight hard copy subscribers
- Wasatch County Council
- Duchesne County Commissioners
- Ute Indian Tribe, Fort Duchesne, UT
- Utah State Historic Preservation Office
- One grazing allotment permittee
- The Environmental Protection Agency
- The State of Utah
- The general public (through our quarterly schedule of proposed actions, and through project information available on the Forest website)

This project has been included on the Ashley National Forest website since January 2021, and the action has appeared in the Ashley National Forest schedule of proposed actions (SOPA) since April 2021.

In response to our February 2021 scoping letter, legal notice, and outreach efforts, we received two formal comment letters: One letter from the Environmental Protection Agency, and one letter from the State of Utah. We are also in communication and coordination with the Uinta-Wasatch-Cache National Forest since portions of the project extend onto that Forest in addition to the Ashley National Forest.